Notice of Allowability	Application No.	Applicant(s)	
	10/724,109	GLUKHOVSKY ET AL.	
	Examiner	Art Unit	
	Philip R. Smith	3739	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *the correspondence of 5/1/2006*.

2. ☒ The allowed claim(s) is/are *35-40,44-51*.

3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
   a) ☐ All b) ☐ Some* c) ☐ None of the:
   1. ☐ Certified copies of the priority documents have been received.
   2. ☐ Certified copies of the priority documents have been received in Application No. _____.
   3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

   * Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
   (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
   1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
   (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☐ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material
5. ☐ Notice of Informal Patent Application (PTO-152)
6. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____.
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____.

DETAILED ACTION

Examiner's Amendment

[01] An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

[02] Authorization for this examiner's amendment was given in an email interview with Mr. Robert Schaffer on May 24, 2006.

[03] This listing of claims will replace all prior versions and listings of claims in the application:

1-34. (Cancelled)

35. A method according to one of claims 44, 48, or 49 comprising: displaying image sensor information.

36. The method according to one of claims 44, 48, or 49 wherein the non-image sensor information is obtained from the gastrointestinal tract.

37. The method according to one of claims 44, 48, or 49 comprising: directing the non-image sensor information to a specified location on the image sensor via an optical guide.

38. The method according to one of claims 44, 48, or 49 wherein relaying the non-image sensor information to an illumination source is achieved by electrically connecting the illumination source to the non-image sensor.

39. The method according to one of claims 44, 48, or 49 comprising the step of interpreting the non-image information obtained.

40. The method according to claim 39 comprising the step of displaying the

interpreted non-image sensor information.

41-43. (Cancelled)

44. A method for transmitting in vivo non-image information, the method comprising:

obtaining non-image sensor information from a sensor;

relaying the non-image sensor information to an illumination source contained within a container, wherein the non-image sensor information is used for modulating either the frequency of the optical output of the illumination source or the amplitude for changing the brightness of the optical output of the illumination source;

relaying the output of the illumination source to an area on an image sensor, the image sensor contained within the container; and

transmitting the image sensor information to an external receiver.

45. An in vivo imaging system comprising:

a non-image sensor to obtain non-image information;

a container enclosing:

an illumination source;

an illumination driver circuit for relaying the non-image sensor information to an illumination source, wherein the non-image sensor information is used for modulating either the frequency of the optical output of the illumination source or the amplitude for changing the brightness of the optical output of the illumination source; and

an imager to image at least the output of the illumination source.

46. The in vivo system of one of claims 45, 50, or 51 comprising a display to display the relayed non-image sensor information.

47. The in vivo system according to one of claims 45, 50, or 51 comprising a

processor to process the relayed non-image sensor information imaged by the imager.

48. A method for transmitting in vivo non-image information, the method comprising:

obtaining non-image sensor information from a sensor;

relaying the non-image sensor information to an illumination source contained within a container, wherein the non-image sensor information is used for modulating the frequency of the optical output of the illumination source for changing the brightness of the optical output of the illumination source;

relaying the output of the illumination source to an area on an image sensor, the image sensor contained within the container; and

transmitting the image sensor information to an external receiver.

49. A method for transmitting in vivo non-image information, the method comprising:

obtaining non-image sensor information from a sensor;

relaying the non-image sensor information to an illumination source contained within a container, wherein the non-image sensor information is used for modulating the amplitude of the optical output of the illumination source for changing the brightness of the optical output of the illumination source;

relaying the output of the illumination source to an area on an image sensor, the image sensor contained within the container; and

transmitting the image sensor information to an external receiver.

50. An in vivo imaging system comprising:

a non-image sensor to obtain non-image information;

a container enclosing:

an illumination source;

an illumination driver circuit for relaying the non-image sensor information to an illumination source, wherein the non-image sensor information is used for modulating the frequency of the optical output of the illumination source for changing the brightness of the optical output of the illumination source; and

an imager to image at least the output of the illumination source.

51. An in vivo imaging system comprising:

a non-image sensor to obtain non-image information;

a container enclosing:

an illumination source;

an illumination driver circuit for relaying the non-image sensor information to an illumination source, wherein the non-image sensor information is used for modulating the amplitude of the optical output of the illumination source for changing the brightness of the optical output of the illumination source; and

an imager to image at least the output of the illumination source.

Reasons for Allowance

[04] The following is an examiner's statement of reasons for allowance.

[04a] The Prior Art does not disclose the relay of non-image sensor information via an image sensor wherein the frequency of an illumination source (i.e., the color) is modulated as a function of said non-image sensor information.

[04b] The Prior Art does not disclose the relay of non-image sensor information

via an image sensor wherein the amplitude of an illumination source (i.e., the brightness) is varied as a function of said non-image sensor information.

[05] Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

[06] Any inquiry concerning this communication or earlier communications from the examiner should be directed to Philip R. Smith whose telephone number is (571) 272 6087. The examiner can normally be reached between 9:00am and 5:00pm.

[07] If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Linda Dvorak can be reached on (571) 272 4764. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

[08] Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

5/24/2006

John P. Leubecker
Primary Examiner